

**DYNAMIC REALLOCATION OF PROCESSING RESOURCES FOR
REDUNDANT FUNCTIONALITY**

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ABSTRACT

A method of and multi-processor based apparatus for dynamically reallocating processors to provide redundant functionality, the method including detecting a fault in a first function having a first priority, the first function supported by a first processor; selecting a second processor supporting a second function having a second priority; and reallocating, responsive to the fault, the second processor to support the first function when a predetermined relationship corresponding to said first priority and said second priority exists, this relationship including, for example, one or more of the first exceeding the second priority and the type and frequency of occurrence of the fault.